## UNITED STATES PATENT OFFICE.

WILLIAM H. HART, JR., OF PHILADELPHIA, PENNSYLVANIA.

## IMPROVEMENT IN NECK-TIE SHIELDS.

Specification forming part of Letters Patent No. 147,935, dated February 24, 1874; application filed May 26, 1873.

To all whom it may concern:

Be it known that I, WILLIAM H. HART, Jr., of the city and county of Philadelphia, and State of Pennsylvania, have invented a new and useful Improvement in the Manufacture of Neck-Tie Shields; and I do hereby declare the following to be a clear and exact description of the nature thereof, sufficient to enable others skilled in the art to which my invention appertains, to fully understand, make, and use the same, reference being had to the accompanying drawings, making part of this specification, in which the figures are views illustrative of my invention, which consists in so forming or cutting the shields from the blank that while there may be side clippings there is no actual loss in the length of the blank, and thus the full number of shields are produced without fragmentary pieces in such length.

Referring to the drawings, A represents a blank or piece of properly-prepared board for the manufacture of shields or supporters for neck-ties, which have become an extensive article of manufacture. These shields are shown at S, and are made to conform nicely to the portions of the neck or collar to which they are applied, and present light and graceful appearance. This blank or strip A is of the exact width of the shield to be made, and in length equal to a certain number of shields when laid together, as in Fig. 2. In cutting the shields from the blank, I employ a knife of such form that the bottom edge or line B B of the shield coincides with the top edge or

line C C thereof, so that when the knife cuts the line C C, which is the top of one shield, it, at the same time, cuts the line B B, which will be the bottom of the adjacent shield, the cut thus being common to both lines. The blank is then advanced and another cut made, and so on throughout, until the entire strip or blank is expended, and it will be seen that the blank A, which, for example, is equal in length to the space between the points a a, will cut four perfect shields, and the only waste is the clippings b b c, shown in dotted lines, but this occurs without in any wise interfering with the production of the perfect shields, since. by my invention, not more than the number of shields stated can be produced between the points a a, the waste being thus immate-

The coincident lines B B C C may be curved or angular, but the result will be the same in either case.

Having thus described my invention, what I claim as new, and desire to secure by Letters Patent, is—

A neck-tie shield, having its upper and lower edges B B C C coincident, as and for the purpose herein set forth.

The above signed by me this 9th day of May, 1873.

WM. H. HART, JR.

Witnesses:
HENRY POLSZ,
JOHN A. WIEDERSHEIM.